

4.6.4 General Creek

The assessed length of General Creek spans 8.3 km from the mouth to the junction with the upper valley. This creek has been divided into five major reaches: delta, incised till, aggrading gravel bed, boulder step-pool, and canyon.

The delta reach encompasses the 0.7 km reach from the mouth to 100 m above Highway 89. Near the mouth, coarse sand is being deposited in 1.5 m high bars. Bank materials include fluvially deposited coarse sand, fluvially deposited silt/sand layers overlying gravel/cobble, and organic rich silt/clay lake deposits. Bank heights vary from 0.1 m in the pool of a beaver dam to about 1.0 m below the dam. Alders, dogwood, and grasses densely cover the banks. Bank erosion is greatest at two locations where large woody debris is causing bank scour. Erosion is also occurring through the undercutting of the silt/sand overlying gravel. The lake deposits are cohesive and appear to be a minor sediment contributor. The overall fine-sediment erosion potential of the reach is low (Hotspots 31 to 34, Table 4-10).

The incised-till reach spans 3.0 km from 100 m above Highway 89 to the furthest upstream U.S. Forest Service bridge. This reach is characterized by a meandering channel incised through a downstream thickening glacial till deposit (Figure 4-33). The result is a channel with 1 meter high floodplains between high till terraces. Escarpments form where the stream engages the terrace wall. Escarpments near the upper end of the reach are less than 3 m-high. Approaching the lower end of the reach, the escarpments reach to an estimated 20 m-high (Figure 4-33). All these escarpments are considered to be major sources of fine sediment. As they continue to erode, large trees become undercut and fall into the channel. The resulting large woody debris exacerbates erosion through scour by directing flows into the banks (Hotspots 16 to 30, Table 4-10).



Figure 4-33. Escarpment where stream has cut into high till terrace is rated as “high” in fine-sediment availability. Incised till reach, General Creek.